



Docket NO. 98 P 5938

I hereby certify that this correspondence is being deposited with the United States Postal Service with sufficient postage as first class mail in an envelope addressed to the Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450, on the date indicated below.

MAIL STOP: APPEAL BRIEF PATENTS

By: 

Date: December 16, 2004

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE
Before the Board of Patent Appeals and Interferences

Applic. No. : 09/441,535 Confirmation No.: 4486
Inventor : Karl Klaghofer et al.
Filed : November 16, 1999
Title : Multimedia Terminal for Telephony
Allowing Multipoint Connections
TC/A.U. : 2665
Examiner : Steven H.D. Nguyen
Customer No. : 24131

Hon. Commissioner for Patents
Alexandria, VA 22313-1450

BRIEF ON APPEAL

S i r :

This is an appeal from the final rejection in the Office action dated June 15, 2004, finally rejecting claims 1-4.

Appellants submit this *Brief on Appeal* in triplicate, including payment in the amount of \$500.00 to cover the fee for filing the *Brief on Appeal*. If any other fees are required for prosecution of this application which are not

12/23/2004 MAHMED1 00000037 09441535

01 FC:1402

500.00 OP

covered by the enclosed payment should be charged to the Deposit Account of Lerner and Greenberg, P.A., No. 12-1099.

Real Party in Interest:

This application is assigned to Siemens Aktiengesellschaft of München, Germany. The assignment will be submitted for recordation upon the termination of this appeal.

Related Appeals and Interferences:

No related appeals or interference proceedings are currently pending which would directly affect or be directly affected by or have a bearing on the Board's decision in this appeal.

Status of Claims:

Claims 1-4 are rejected and are under appeal. No claims were cancelled.

Status of Amendments:

No claims were amended after the final Office action. A Response under 37 CFR § 1.116 was filed on September 17, 2004. The Primary Examiner stated in an *Advisory Action* dated November 3, 2004, that the request for reconsideration had been considered but did not place the application in condition for allowance.

Summary of the Claimed Subject Matter:

As stated in the first paragraph on page 1 of the specification of the instant application, the invention relates to a multimedia terminal for telephony allowing multipoint connections to a plurality of other terminals.

Appellants explained on page 11 of the specification, line 21, that, referring now to the figures of the drawings in detail and first, particularly, to Fig. 1 thereof, there is shown an exemplary embodiment of a multimedia terminal MM-terminal according to the invention in a schematic block diagram in the form of its expanded protocol layer model. As is usual in networks based on ITU-T H.323, the communication of the terminal MM-terminal is based on the Internet protocol IP. Taking the Internet protocol IP as a basis, the right-hand side of Fig. 1 shows the protocol stack for the signaling, which handles the call control.

It is outlined on page 12 of the specification, line 6, that, in this case, on the basis of the Internet protocol IP and the signaling protocol TCP, a function module H.225.0 based on the ITU-T Protocol H.225.0 is provided for a basic call control signaling in H.323 networks. Exemplary messages for this function module H.225.0 are SETUP or CONNECT.

It is further outlined on page 12 of the specification, line 12, that, also, on the basis of the signaling protocol TCP, there is a function module H.245 based on the ITU-T Control Protocol H.245. This function module H.245 is used, among other things, for exchanging "TerminalCapability" messages, that is to say for submitting and receiving information regarding terminal capabilities. This function module H.245 is also used for defining task distributions such as master and slave functions and for opening and closing logical channels used for useful data transmissions. The function module H.245 is also responsible for messages such as "MultipointConference", "CommunicationModeCommand" or "EnableDecentralizedConference" in a network based on ITU-T H.323. These messages are necessary for the above-described methods for producing a multipoint conference and are optionally usable in a multimedia terminal according to the invention.

Appellants stated on page 13 of the specification, line 2, that, on top of the function module H.225.0, there are function modules of additional facility controllers or features controls, such as, according to the invention, the function module "CONTROL CONFERENCE", which corresponds to a controller or control for processing a signaling for point-to-multipoint connections within the context of the invention. As

further function modules of additional facility controllers or feature controls, Fig. 1 shows, by way of example, a function module H.450 "HOLD" for producing or implementing a "HOLD" function based on ITU-T H.450, and a further function module H.450 having further variants, indicated by dots, based on the ITU-T Standard H.450.

It is also stated on page 13 of the specification, line 15, that Fig. 1 shows, on the left next to the signaling stack described above, a useful data stack. This useful data stack is also based on the Internet protocol IP, on which there is UDP and on that, in turn, a real-time protocol RTP. In addition to the real-time protocol RTP, the protocol UDP also supports a real-time control protocol RTCP and that part H.225.0 RAS of the control protocol according to ITU-T H.225.0 which concerns the areas of registration, administration, and status.

It is outlined in the last paragraph on page 13 of the specification, that, on the basis of the real-time protocol RTP, there are codecs or at least decoders for audio and video, which are denoted by AUDIO, VIDEO in Fig. 1. Such audio codecs AUDIO are configured according to one of the ITU-T Standards G.711, G.723.1, or G.728, for example. Audio decoders AUDIO are for example also defined by ISO MPEG4

standards. ISO MPEG4 also defines corresponding video decoders VIDEO. When decoders based on ISO MPEG4 are used, proprietary coders are possibly contained in a multimedia terminal MM-TERMINAL according to the invention.

As set forth on page 14 of the specification, line 9, the real-time control protocol RTCP and the codecs or decoders for audio and video AUDIO, VIDEO are controlled by a media controller MEDIA CONTROL which, among other things, is responsible for the interaction of media input devices INPUT-DEVICE and media output devices OUTPUT-DEVICE provided in the multimedia terminal MM-TERMINAL. In this respect, media input devices INPUT-DEVICE are, for example, cameras for video data, microphones for audio data or interfaces for data sources not included in the multimedia terminal MM-TERMINAL. In this context, output devices OUTPUT-DEVICE are, for example, a screen for video data, loudspeakers for audio data or interfaces for output devices not included contained in the multimedia terminal MM-TERMINAL, such as printers or bulk memories.

As further explained on page 14 of the specification, line 24, the media controller MEDIA CONTROL also controls a device for mixing datastreams originating from terminals involved in a multipoint connection and for providing datastream mixtures to

these terminals. Such a mixing device, whose manner of operation has been described above, is illustrated in Fig. 1 by the reference symbol MIXER.

It is described on page 15 of the specification, line 5, that the described stack for useful data handling RTP, RTCP, H.225.0, AUDIO, VIDEO, and MEDIA CONTROL and the described stack for a signaling handling H.245, H.225.0, CONTROL CONFERENCE, H.450Hold, and H.450 are coupled to an application programming interface API via a coordination function COORDINATION FUNCTION. In this case, the coordination function COORDINATION FUNCTION coordinates the interaction of the units in this stack with the application programming interface API.

It is further described on page 15 of the specification, line 14, that examples of an application programming interface API are TAPI or CAPI. The application programming interface API serves as an interface between application programs or a user interface and the coordination function COORDINATION FUNCTION.

Appellants outlined in the last paragraph on page 15 of the specification, line 19, that, in the initial state shown in Fig. 2, there is an active connection between the terminals TeA and TeB of two subscribers A and B. In this case, at least the terminal TeA is a multimedia terminal MM-TERMINAL, as

shown in Fig. 1, to the extent that a function module CONTROL CONFERENCE is provided as a controller for a processing signaling for point-to-multipoint connections and a device MIXER for mixing datastreams originating from terminals involved in a multipoint connection.

As explained on page 16 of the specification, line 4, the subscriber A sends a Setup message based on ITU-T H.323 from the terminal TeA to a terminal TeC of a subscriber C. In this case, as shown in Fig. 2, a facility message or feature message FAC(HoldNotification.inv) can optionally be transmitted from the terminal TeA of subscriber A to the terminal TeB of subscriber B in order to put the terminal TeB into the "hold" state.

Appellants further stated on page 16 of the specification, line 12, that the terminal TeC uses a Connect message to acknowledge to the terminal TeA the Setup message previously received from the latter. A consultation connection in the form of logical channels is then set up between the terminals TeA and TeC. If the subscriber A associated with the terminal TeA wants a conference circuit at this instant, the terminal TeA transmits a facility message FAC(ConferenceIndication.inv) to each of the terminals TeB and TeC in order to indicate that a conference configuration is being called or selected. If,

before a Setup message was transmitted to the terminal TeC, the terminal TeA had transmitted a message FAC(HoldNotific.inv) to the terminal TeB, the terminal TeB can be put back again into an active state from the "hold" state by a message FAC (RetrieveNotific.inv) received from the terminal TeA. The logical channels between the terminals TeA, TeB, and TeC, which were already open before the conference was started, continue to be used.

Grounds of Rejection to be Reviewed on Appeal

Whether or not claims 1-4 are obvious over U.S. Patent No. 6,205,124 to Hamdi (hereinafter Hamdi) in view of U.S. Patent No. 6,163,531 to Kumar (hereinafter Kumar) under 35 U.S.C. §103.

Argument:

An object of the instant application is to provide a multimedia end device for the realization of H.323 multipoint connections. According to the invention, the multimedia end device includes a controller for signal processing for point-to-multipoint connections as well as a mixer for mixing the data streams from the conference participants (including the multimedia end device itself) and for distributing data stream mixtures to the conference participants.

Claim 1 calls for, *inter alia*, a multimedia terminal for telephony based on ITU-T Standard H.323 for setting up a multipoint connection to a plurality of terminals. The multimedia terminal includes the following features:

a controller for processing signaling information for a point-to-multipoint connection between the multimedia terminal and a plurality of terminals;
and

a mixer, connected to said controller, for mixing datastreams originating at the multimedia terminal and at the plurality of terminals and for providing datastream mixtures to the plurality of terminals.

Hamdi discloses a conferencing system that is connected to an analog telephone network (POTS 181) via a first and a second modem in order to communicate with a first and a second remote modem 189, 188 via the telephone network. So-called digital simultaneous voice and data (DSVD) modems are used as modems, by which, voice and data can be transmitted in parallel via an analog telephone line. For this purpose, the data and voice are converted into analog signals within the transmission bandwidth of the POTS by the DSVD modem. Thus, the essential aspect in Hamdi is to be seen in realizing a conferencing circuit, where, in addition to voice, data are also to be transmitted - via an analog telephone network.

The Examiner notes that Hamdi does not disclose a multimedia terminal for telephony based on ITU-T Standard H.323 for setting up a multipoint connection to a plurality of terminals. The Examiner relies on Kumar for teaching setting up conference calls based on ITU-T Standard H.323. The Examiner further states that Hamdi suggests a DSVD multipoint control unit of a terminal using ITU for processing the setup of a teleconference between terminals. The Examiner states "Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to apply a H.323 terminal for setup a teleconference between terminals as disclosed by Kumar's system into Hamdi's system". The Examiner further states that grounds for the combination by stating "The motivation would have been to provide a multipoint conference system without subscribing to a service provider" (emphasis added).

In prior art H.323 based conference systems such as those taught in Kumar, a central conference control device (MCU: multipoint control unit) controls the conference signals and mixes and distributes the data streams of the conference participants. The central conference control device (MCU) should not be confused with an end device as that of the invention of the instant application. In col. 3, lines 27 to 30, of Kumar it is even explicitly defined that an MCU is a

stand-alone unit that is disposed outside of an end device. In summary, Kumar describes a conference system based on a digital protocol using the ITU-T standard H.323 and a stand alone MCU.

Thus, an essential advantage of the invention of the instant application is that no such central MCU is necessary. Furthermore, the integration of the signal processing and mixing functionality in an end device according to the invention allows for a more flexible conference set-up from the end device. Connections to several end devices, for example, can be set-up parallel from the end device according to the invention. Furthermore, due to its mixing function, the end device according to the invention also integrates the use of non-multipoint end devices in a conference circuit.

The objects disclosed in Hamdi do not offer any incentive that would have given anyone with ordinary skill in the art reason to combine Kumar with Hamdi in a manner as chosen by the Examiner. The motivation "to provide a subscriber a multipoint conference system without subscribing to a service provider" indicated by the Examiner would not explain why one with ordinary skill in the art would choose Kumar and combine it with Hamdi. Whether a subscriber must use a service provider does not depend on whether an analog or digital

transmission network is used, but rather depends on whether the subscribers are close enough to each other to be able to be connected via a private network or whether an external network of a service provider is necessary. Kumar also uses a service provider (see Kumar, Fig. 1, ISDN network 150), when remote subscribers are to be integrated into the conference. As is the case in Kumar, a public POTS is only necessary in Hamdi when remote subscribers are to be connected. In conferences via a private branch exchange, Hamdi also does not require a service provider. A consideration of incorporating the teaching of Kumar thus would not have an influence on whether or not a service provider is necessary. The motivation indicated by the Examiner could thus also be satisfied without Kumar, in that a private (analog) network is used instead of the POTS. Applicant simply does not understand the "motivation" suggested by the Examiner.

It is further believed that Kumar actually teaches away from the invention of Hamdi as Kumar requires a conference service (e.g. MCU) centrally located in the network. This means that the advantage of a functionality, which is transferred to the terminal, which does not require access to a central conference service, is lost in Kumar. Otherwise, neither Hamdi nor Kumar contains information as to why Kumar should

only carry out the conversion to H.323, but not the central conference device, which is provided according to H.323.

Furthermore, and contrary to the Examiner's statement, it is respectfully stated that Hamdi does not propose to configure a telephone conference according to an ITU standard. Instead, ITU standards are mentioned in Hamdi exclusively in context with types of modulation that allow for a parallel transmission of voice and data via a voice frequency band. Only the ITU-T-recommendation V.70 is explicitly indicated, which pertains to the above-mentioned DSVD technology (digital simultaneous voice and data). See col. 1, lines 49-66 of Hamdi. This ITU standard has nothing to do with configuring teleconferences, but pertains to a DSVD on-off operations (see, for example, col. 2, lines 20-23 in Hamdi).

The mere mentioning of the ITU-T-V.70 standard in Hamdi is not believed to suggest the use of the H.323 standard, which differs therefrom, because the V.70 standard pertains to a completely different technical problem than the H.323 standard on which the invention is based. Furthermore, the combination of the H.323 standard and not one of several hundred other ITU standards, with Hamdi seems arbitrary and, therefore, motivated by hindsight.

No motivation is believed to exist in the prior art that would have prompted a person with ordinary skill in the art to combine Kumar with Hamdi in the manner chosen by the Examiner. Such a combination of features of different documents that were chosen afterwards by the Examiner with the knowledge of the invention in order to cover the features of claim 1, is respectfully believed to correspond to an inadmissible piecemeal hindsight consideration.

"Under Section 103 teachings of references can be combined **only** if there is some suggestion or incentive to do so." ACS Hospital Systems, Inc. v. Montefiore Hospital et al., 221 USPQ 929, 933, 732 F.2d 1572 (Fed. Cir. 1984) (emphasis original).

"Although a reference need not expressly teach that the disclosure contained therein should be combined with another, the showing of combinability, in whatever form, must nevertheless be '**clear and particular.**'" Winner Int'l Royalty Corp. v. Wang, 53 USPQ2d 1580, 1587, 202 F.3d 1340 (Fed. Cir. 2000) (emphasis added; citations omitted); Brown & Williamson Tobacco Corp. v. Philip Morris, Inc., 56 USPQ2d 1456, 1459 (Fed. Cir. Oct. 17, 2000). Applicants believe that there is no "clear and particular" teaching or suggestion in Hamdi to incorporate the features of a multimedia terminal for telephony based on ITU-T Standard H.323 for setting up a multipoint connection to a plurality of terminals, and there

is no teaching or suggestion in Kumar to incorporate these features in Hamdi.

Furthermore, the H.323 technology disclosed in Kumar is purely based on digital data packet transport and this is not believed to be compatible in a technical sense with the conference system in Hamdi that is based on the specific analog modems. The objects disclosed in Hamdi and Kumar are based on entirely different technologies. Due to the fact that the H.323 standard does not only describe an individual communication terminal but an entire communication infrastructure, Hamdi's entire circuit structure would have to be considerably changed for implementing the H.323 standard in Hamdi. However, neither Hamdi nor Kumar contain any information which would have actually given a person of ordinary skill in the art any reason or would have motivated the person of ordinary skill in the art to such an extraordinary redesigning.

Claim 2 stands or falls with claim 1.

Claim 3 contains similar claim language to claim 1 and recites:

a function module for setting up a multipoint connection to a first terminal and to a second terminal based on ITU-T Standard H.323;

a controller, connected to said function module, for processing signaling information for a point-to-multipoint connection between the multimedia terminal, the first terminal, and the second terminal; and

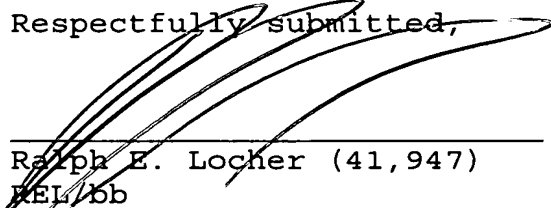
a mixer, connected to said controller, for mixing datastreams originating at the multimedia terminal, at the first terminal, and at the second terminal and for providing datastream mixtures to the first terminal and to the second terminal.

Claim 3 more positively recites the feature of the ITU-T Standard H.323 that is used in the functional module. The arguments recited on behalf of claim 1 equally apply to claim 3 and are not repeated.

Claim 4 stand or falls with claim 3.

The honorable Board is therefore respectfully urged to reverse the final rejection of the Primary Examiner.

Respectfully submitted,



Ralph E. Locher (41,947)
REL/bb
Date: December 16, 2004
Lerner and Greenberg, P.A.
Post Office Box 2480
Hollywood, Florida 33022-2480
Tel: (954) 925-1100
Fax: (954) 925-1101